

Investigating how cost of disinfectant affects the amount of bacteria present.



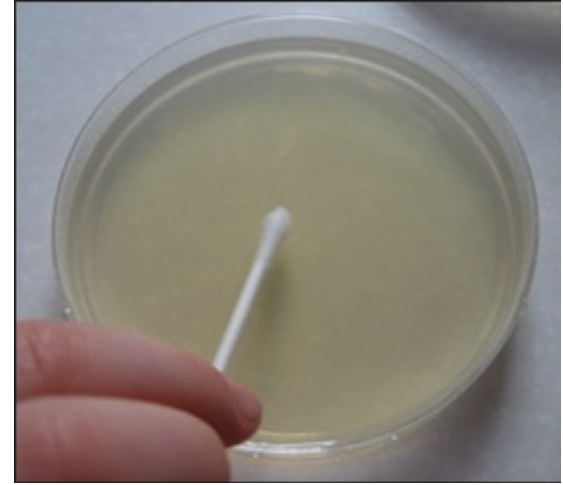
Prediction

- We predict that more expensive disinfectants will destroy more microbes than cheaper ones.
- We thought this because more expensive disinfectants will have stronger chemicals to engulf and destroy the bacteria, therefore stopping them from multiplying and reducing their number.
- Also more expensive disinfectants may have more money put into researching which chemicals are the best at destroying bacteria.

Method

- We used a variety of disinfectants from different brands.

- We swabbed the area without any disinfectant and smeared it onto a Petri dish.



We poured 2ml of disinfectant on an area of 20cm²

We left the disinfectant on for 30 seconds and then swabbed again.

Results

Disinfectant	Time	Microbe growth BEFORE	Microbe growth AFTER
1	30	A few yellow microbes	Lots of pale yellow microbes INCREASE
2	30	Mixture of yellow, orange and cream microbes	A few yellow and orange microbes. DECREASE
3	30	Mixture of yellow, orange and cream microbes	A few yellow and orange microbes. DECREASE
4	30	Yellow and cream microbes	A few yellow and cream microbes DECREASE
5	30	Mixture of yellow, orange, black and cream microbes	A few yellow and orange microbes. DECREASE

Conclusion

- From our results we noticed with the exception of one disinfectant, the amount of bacteria reduced after being disinfected for 30 seconds.
- The disinfectant did not destroy all bacteria.
- The cost of the disinfectant did not affect its ability to destroy microbes. This shows that our prediction was not correct.